

**Amendments to the Claims:**

This listing of claims will replace all prior versions and listings of claims in the application:

**Listing of the Claims:**

1. (Previously Presented) A method comprising:
  - generating a software test module to produce a test result by performing a test on instructions;
  - identifying a first instruction in a sequence of instructions, the first instruction comprising a target address and invoking a function or procedure,
  - replacing the first instruction with a second non-identical instruction to transfer control to the test module, the second instruction comprising fewer bytes than the first instruction;
  - compacting the instructions to eliminate a hole created by replacing the first instruction with the second instruction; and
  - storing the target address encrypted in a table, the test module to locate the target address in the table and to set an execution address to the target address if test results indicates the instructions are to proceed.
2. (Canceled)
3. (Previously Presented) The method of claim 1 further comprising:
  - corresponding the target address with the instruction address in the encrypted table.

4. (Previously Presented) The method of claim 1 further comprising:  
profiling the instructions to identify the first instruction as an instruction to  
replace.
5. (Previously Presented) A device comprising:  
a processor;  
a machine-readable storage medium coupled to the processor by way of a  
bus, the storage medium having stored thereon instructions which, when  
executed by the processor, cause the data processing device to:  
generate a software test module, the test module to produce a test result by  
performing a test on the instructions;  
identify a first instruction in a sequence of instructions, the first instruction  
comprising a target address and invoking a function or procedure;  
replace the first instruction a second non-identical instruction to transfer  
control to the test module, the second instruction comprising fewer bytes than the  
first instruction;  
compact the instructions to eliminate a hole created by replacing the first  
instruction with the second instruction; and  
store the target address in an encrypted table, the test module to locate the  
target address in the table and to transfer control to the target address if test results  
indicates the instructions are to proceed.
6. (Canceled)

7. (Previously Presented) The device of claim 5 in which the instructions, when executed by the processor, further cause the device to:

corresponding the target address with the instruction address in the encrypted table.

8. (Previously Presented) The device of claim 5 in which the instructions, when executed by the processor, further cause the device to:

profile the instructions to identify the first instruction as an instruction to replace.

9. (Previously Presented) An article comprising:

a machine-readable medium having stored thereon instructions which, when executed by a data processing device, cause the data processing device to:

generating a software test module to produce a test result by performing a test on the instructions;

identify a first instruction in a sequence of instructions, the first instruction comprising a target address and invoking a function or procedure;

in the instructions, replace a first instruction with a second non-identical instruction to transfer control to the test module, the second instruction comprising fewer bytes than the first instruction;

compact the instructions to eliminate a hole created by replacing the first instruction with the second instruction; and

store the target address in an encrypted table, the test module to locate the target address in the table and to transfer control to the target address if test results indicates the instructions are to proceed.

10. (Canceled)

11. (Previously Presented) The article of claim 9 in which the instructions, when executed by a data processing device, further cause the data processing device to:  
correspond the target address with the instruction address in the encrypted table.

12. (Previously Presented) The article of claim 9 in which the instructions, when executed by a data processing device, further cause the data processing device to:  
profile the instructions to identify the first instruction as an instruction to replace.

13. (Currently Amended) An article comprising:  
a machine-readable medium having stored thereon:  
instructions which, when executed by a data processing device, cause the data processing device to:  
transfer control to a software test module when a second instruction having an instruction address in the instructions is executed by the data processing device, the second instruction replacing a non-

identical first instruction comprising a target address, the first instruction to invoke a function or procedure, and the first instruction comprising more bytes than the second instruction the software test module comprising

a table comprising a to store the target address of the replaced first instruction; and

test instructions to produce a test result by performing a test on the instructions, the test module to locate the target address in the table and to transfer control to the target address if the test result indicates the instructions are to proceed.

14. (Previously Presented) The article of claim 13 in which the instructions further comprise instructions to load the test module.

15. (Previously Presented) The article of claim 13 in which the test module further comprises instructions to set an exception handler to transfer control to the test instructions when the second instruction is executed by the data processing device.

16. (Previously Presented) The article of claim 14 in which the test module further comprises:

instructions moved from the instructions, the instructions moved to make room in the instructions for the instructions to load the test module.